gitStarted

the zero to mastery guide
to contribute to open source
projects

ZERO TO
MASTERY

What is
open source?

Open source is the original way of creating software – in an open, transparent and collaborative manner.

Open source means that you get the final executable for a software project, and also have access to the source code from which it was produced.

Having access to the source code means that you can better understand how the program functions and more importantly you can modify it to fix any problems you have with the software or add new features which you desire.

Why should I
contribute?

improve
your SKILLS

make
a project
better

fix
an issue

add
new features

find
mentors
teach
others

learn
new skills

grow
your reputation
online

how to contribute to open source?

*Do you **code**? You can contribute by writing your code

*Do you **design**? You can contribute by styling the project

*Do you **write**? You can improve the project documentation

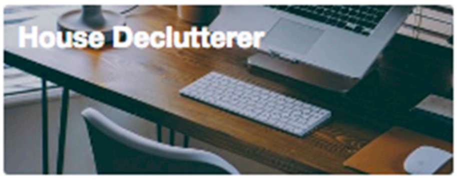
*Do you like **organizing** things? You can contribute by organizing events, deadlines, and track progress on projects

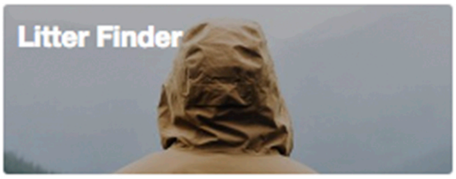
*Do you like **helping** people? You can contribute by answering their questions and guide them through

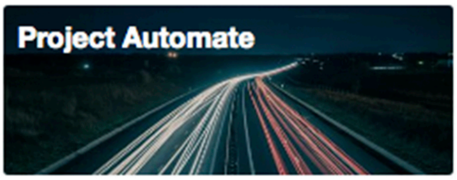
our projects

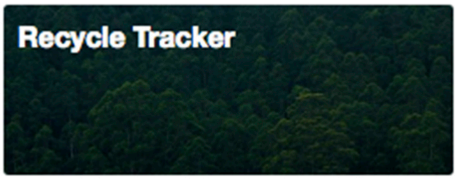
We don't care if you break things. This is a playground and
we encourage failing often. Use this as a practice ground
and enjoy contributing to projects you create with your fellow students.

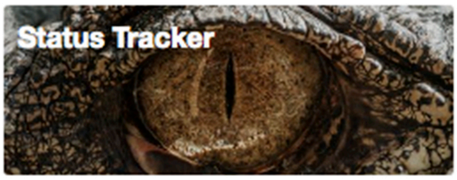
Book Tracker


House Declutterer

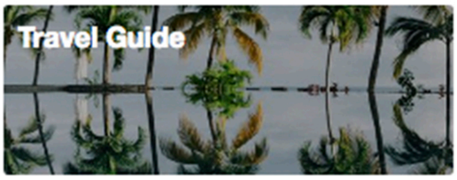

Litter Finder


Project Automate


Recycle Tracker


Status Tracker

Time Collector


Travel Guide

5 steps to start

1. Read the anatomy of an open source project
2. Find out which projects you want to join
3. Sign up for the one (s) you'd like to contribute
4. Make your first pull request
5. Go join a project and start contributing!

more on: https://github.com/zero-to-mastery/start-here-guidelines

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Git

It is an open source version control system (VCS). This means that when developers create something, they make constant changes to the code, releasing new versions up to and after the release.

Version control systems keep these revisions straight, storing the modifications in a central repository, allowing developers to easily collaborate. How? Download the version, make changes and upload the newest revision.

GitHub

Git is a command line tool, but the center around which all things involving Git revolve is the Hub- GitHub- where developers store their projects and network with like-minded people.

So Github is a Git repository hosting service, offering a web-based graphical interface that provides access control and other collaboration features.

Let's take you through the steps to get you started on Git and Github

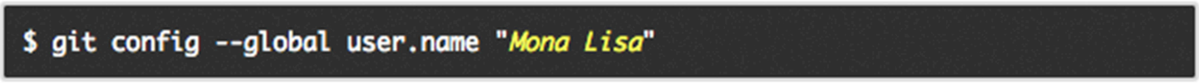
first contributions

a step by step guide

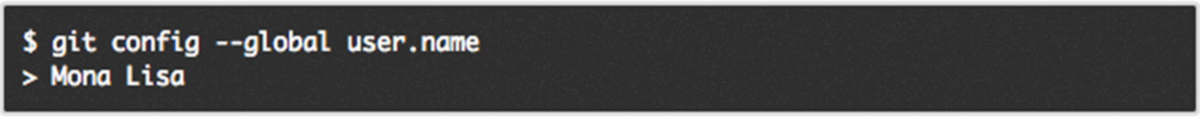
Set up Git!

1) Download and install Git on your computer

2) Open Terminal and set a Git username. Type in and confirm your global username (the one for every repository)

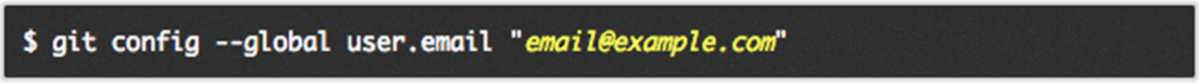


```
$ git config --global user.name "Mona Lisa"
```

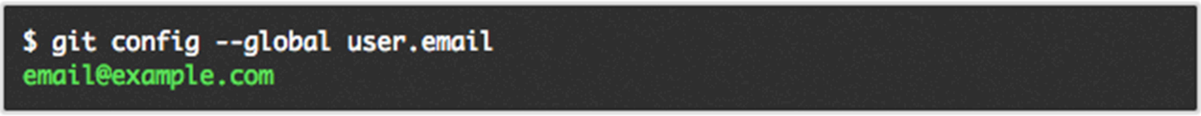


```
$ git config --global user.name
> Mona Lisa
```

3) Set an email address in Git. Type in and confirm.



```
$ git config --global user.email "email@example.com"
```



```
$ git config --global user.email
email@example.com
```

4) Add the email address to your Github account by setting the commit email address on Github, so that the commits are attributed to you and appear on your contributions graph.

first contributions

a step by step guide

GitHub time!

1) Set up an account on Github

2) Check out the Zero to Mastery organization here and discover the different repositories.

3) You can start contributing!

Some vocabulary

Repository: also known as repo, is a location where all the files of a particular project are stored. Each project has its own repo and you can access it with a unique URL.

Forking a repo: “Forking” is when you create a new project based off of another project that already exists. If you find a project on GitHub that you’d like to contribute to, you can fork the repo, make the changes you’d like, and release the revised project as a new repo. If the original repository that you forked to create your new project gets update, you can easily add those updates to your current fork.

Pull request: you’ve forked a repository, made a great revision to the project and want it to be recognized by the original developer -maybe even included in the official project/repo. Pull a request.

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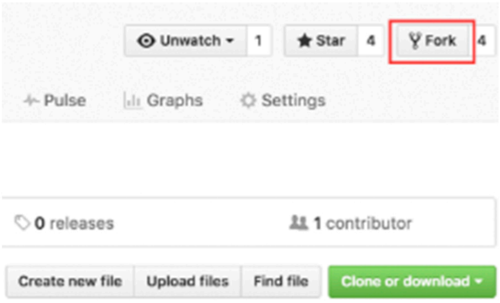
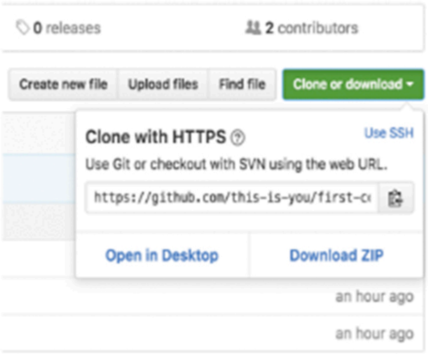
The authors of the original repository can see your work, and then choose whether or not to accept it into the official repo.

Step by step

Fork this repository clicking on the fork button. This creates a copy on your account.


Unwatch
1
Star
4
Fork
4
Pulse
Graphs
Settings
0 releases
1 contributor
Create new file
Upload files
Find file
Clone or download

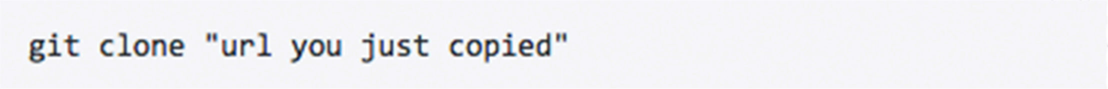
Clone the repository to your computer. Click on the clone button and click the copy to clipboard icon.


0 releases
2 contributors
Create new file
Upload files
Find file
Clone or download
Clone with HTTPS
Use SSH
Open in Desktop
Download ZIP
an hour ago
an hour ago

Use Git or checkout with SVN using the web URL.

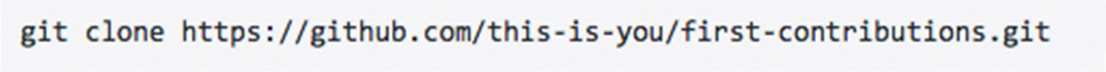
```
https://github.com/this-is-you/first-c
```

Open Git terminal, type in the following git command and run it



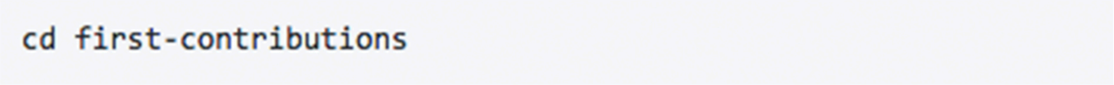
```
git clone "url you just copied"
```

which will look something like this



```
git clone https://github.com/this-is-you/first-contributions.git
```

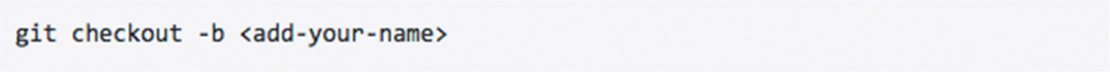
Change to the repo directory



```
cd first-contributions
```

Create a branch for your edits.

Branching exists to help you manage the different ideas or features in progress. When you create a branch, you're creating an environment where you can try new ideas without affecting the master branch. Therefore, experiment and commit changes, as these won't be merged until they're ready to be reviewed by other collaborator.



```
git checkout -b <add-your-name>
```

Make changes and commit them.

Whenever you add, edit or delete a file, you're making a commit, and adding them to your branch. This process keeps

track of your progress as you work on a feature branch. Commits also create a transparent history of your work that others can follow to understand what you've done and why.

For example, you open a Contributors.md file in a text editor, add your name and save it. Go to the project directory and execute `git status` , you'll see there the changes. Add those changes to the branch, with command `git add`

```
git add.
```

And commit them using `git commit`

```
git commit -m "Add <your-name> to Contributors list"
```

Push the changes to GitHub

```
git push origin <add-your-name>
```

Now, let's pull request

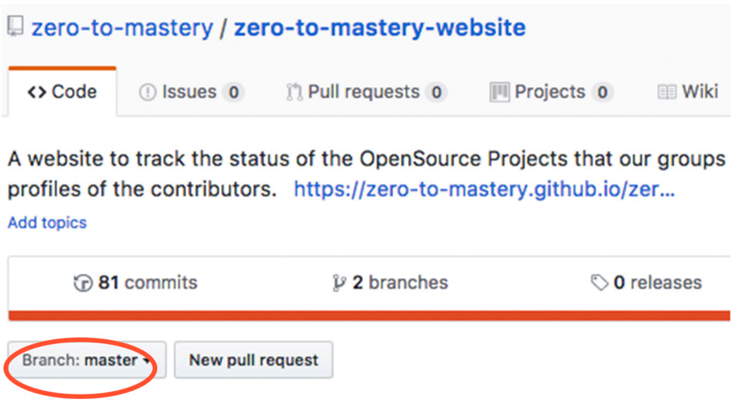
What we are doing here is basically propose and collaborate on changes to a repository.

first contributions

a step by step guide

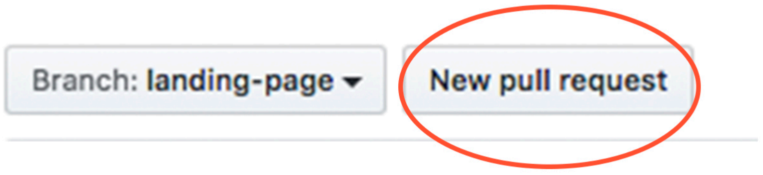
1) Navigate to the main page of the repository.

2) In the “Branch” menu, choose the branch that contains your commits.

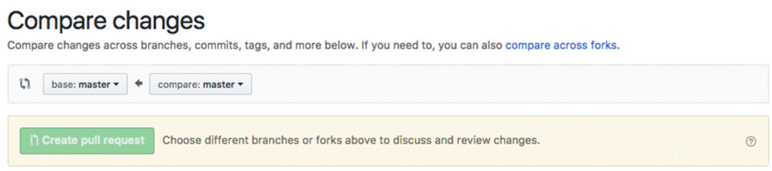

zero-to-mastery / zero-to-mastery-website
<> Code
Issues 0
Pull requests 0
Projects 0
Wiki
Add topics
81 commits
2 branches
0 releases
Branch: master
New pull request

A website to track the status of the OpenSource Projects that our groups profiles of the contributors. https://zero-to-mastery.github.io/zer...

3) To the right of the Branch menu, click New Pull Request


Branch: landing-page
New pull request

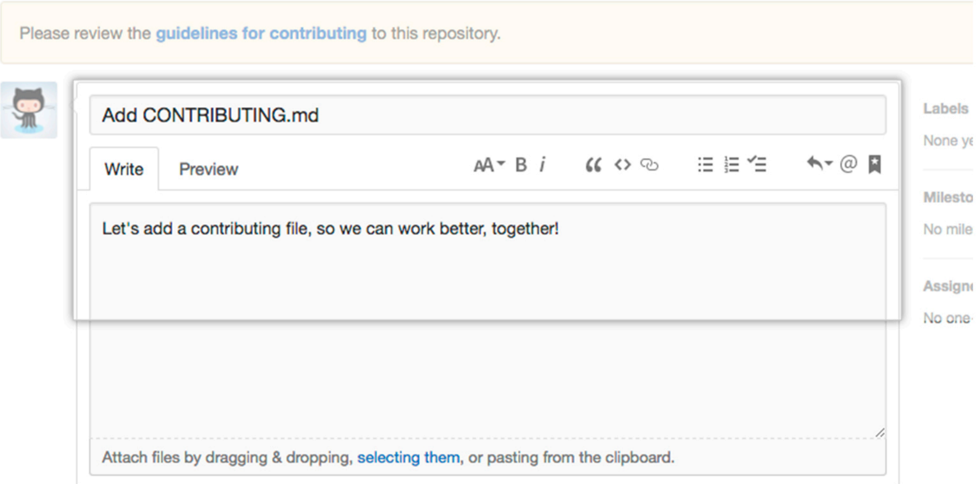
4) Use the base branch dropdown menu to select the branch you’d like to merge your changes into, then use the compare branch drowpdown menu to choose the topic branch you made your changes in


Compare changes
base: master
compare: master
Create pull request

Compare changes across branches, commits, tags, and more below. If you need to, you can also compare across forks.

Choose different branches or forks above to discuss and review changes.

5) Type a title and description for your pull request.



Please review the guidelines for contributing to this repository.

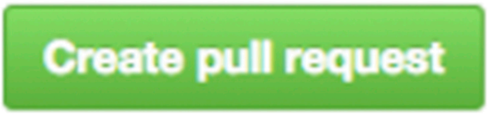
Add CONTRIBUTING.md

Let's add a contributing file, so we can work better, together!

Attach files by dragging & dropping, selecting them, or pasting from the clipboard.

Write
Preview
AA B i
Labels
None ye
Milesto
No mile
Assign
No one

6) Click create pull request



Create pull request

Congrats!

you've just
made your first
contribution

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here are some resources!

- https://techcrunch.com/2012/07/14/what-exactly-is-github-anyway/
- https://www.howtogeek.com/180167/htg-explains-what-is-github-and-what-do-geeks-use-it-for/
- https://www.codefellows.org/blog/git-and-github-what-s-the-difference/
- https://www.udemy.com/the-complete-web-developer-in-2018/learn/v4/t/lecture/8725782?start=0
- https://rubygarage.org/blog/how-contribute-to-open-source-projects
- https://egghead.io/lessons/javascript-exploring-a-repository
- https://opensource.guide
- https://github.com/zero-to-mastery/start-here-guidelines/blob/master/Get%20Started.md
- https://help.github.com/articles/set-up-git/
- https://github.com/Roshanjossey/first-contributions
- https://opensource.guide/how-to-contribute/#how-to-submit-a-contribution

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the complete web developer course
created by Andrei Neagoie

this guide was made with love by Wan Raitelli
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